

AMENDMENTS TO THE SPECIFICATION:

Kindly replace the paragraph beginning at page 3, line 7, with the following amended paragraph:

According to the transformed bit-sliced encoding method, a portion of bit-sliced data constituting a predetermined [[pit]] bit plane is lossless-encoded, and position information of a peak, the remaining bit plane information, and peak data are encoded as side information.

Kindly replace the paragraph bridging pages 5 and 6 with the following amended paragraph:

The encoding apparatus according to the present invention bit-slices input digital data and then encodes the data bits from significant bits to least significant bits. In other words, the encoding priority of data to be encoded depends on the relative significance of data bits. High priority bits have priority over low priority bits. Since significant bits are first encoded, if the number of bits that has been encoded up to now exceeds or is equal to an allowed bit range, encoding may stop to finish manufacturing finishing the generation of a bitstream. If ~~manufacturing~~ generating the bitstream ~~suspends~~ is interrupted, a portion of data decoded by a decoder may be lost, and thus the decoded data may be distorted compared to original data. However, since significant information is first encoded, the quality of the decoded data is not greatly degraded compared to the lost amount of data. Also, a decoding method according to an aspect of the present invention performs a process inverse to the encoding method.

Kindly replace the paragraph beginning at page 13, line 26, with the following amended paragraph:

First, bit-sliced data of a bit plane ① except bit planes filled with values of "0", i.e., "1100", is encoded. Next, position information for indicating the position of a quantization sample except quantization samples filled with values of "0", i.e., a quantization sample ④ having a peak value, is expressed as 2 bits, i.e., "11b".

Thereafter, index information for indicating that parts filled with values of "0", i.e., not-encoded parts, are the bit planes ②, ③, ④ and ⑤ is expressed as 3 bits, i.e., "100b", and parts of the bit planes ②, ③, ④ and ⑤ of the quantization sample ④, i.e., "1010b (peak data)", are encoded into [[""]] 3-4 bits.